Pinning down the linearly-polarised gluons inside unpolarised protons using quarkonium-pair production at the LHC (vol 784, pg 217, 2018)

Lansberg, Jean-Philippe; Pisano, Cristian; Scarpa, Florent; Schlegel, Marc

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Corrigendum

Corrigendum to: "Pinning down the linearly-polarised gluons inside unpolarised protons using quarkonium-pair production at the LHC" [Phys. Lett. B 784 (2018) 217]

Jean-Philippe Lansberg [a,*], Cristian Pisano [b,c], Florent Scarpa [a,d], Marc Schlegel [e,f]

[a] IPNO, CNRS-IN2P3, Univ. Paris-Sud, Université Paris-Saclay, 91406 Orsay Cedex, France
[b] Dipartimento di Fisica, Università di Pavia, and INFN, Sezione di Pavia Via Bassi 6, I-27100 Pavia, Italy
[c] Dipartimento di Fisica, Università di Cagliari, and INFN, Sezione di Cagliari Cittadella Universitaria, I-09042 Monserrato (CA), Italy
[d] Van Swinderen Institute for Particle Physics and Gravity, University of Groningen, Nijenborgh 4, 9747 AG Groningen, the Netherlands
[e] Institute for Theoretical Physics, Universität Tübingen, Auf der Morgenstelle 14, D-72076 Tübingen, Germany
[f] Department of Physics, New Mexico State University, Las Cruces, NM 88003, USA

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ABSTRACT

We correct a numerical mistake and mislabellings in Fig. 4.

In the four plots of Fig. 4, the y-axis label should read $2\langle\cos(2,4)\phi\rangle$ instead of $\langle\cos(2,4)\phi\rangle$ and, in addition, the curves of Fig. 4 (a) & (b) should be divided by 2. Overall, Fig. 4 should be replaced by a new figure (Fig. 1).

Correspondingly, in the section 6 and the caption of Fig. 4, $\langle\cos(2,4,n)\phi\rangle$ should all read $2\langle\cos(2,4,n)\phi\rangle$. On page 221, "$\langle\cos 2\phi\rangle$ nearly reaches 30%" should read "$2\langle\cos 2\phi\rangle$ nearly reaches 15%". Our conclusions remain unchanged.

References

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* Corresponding author.
E-mail address: lansberg@in2p3.fr (J.-P. Lansberg).

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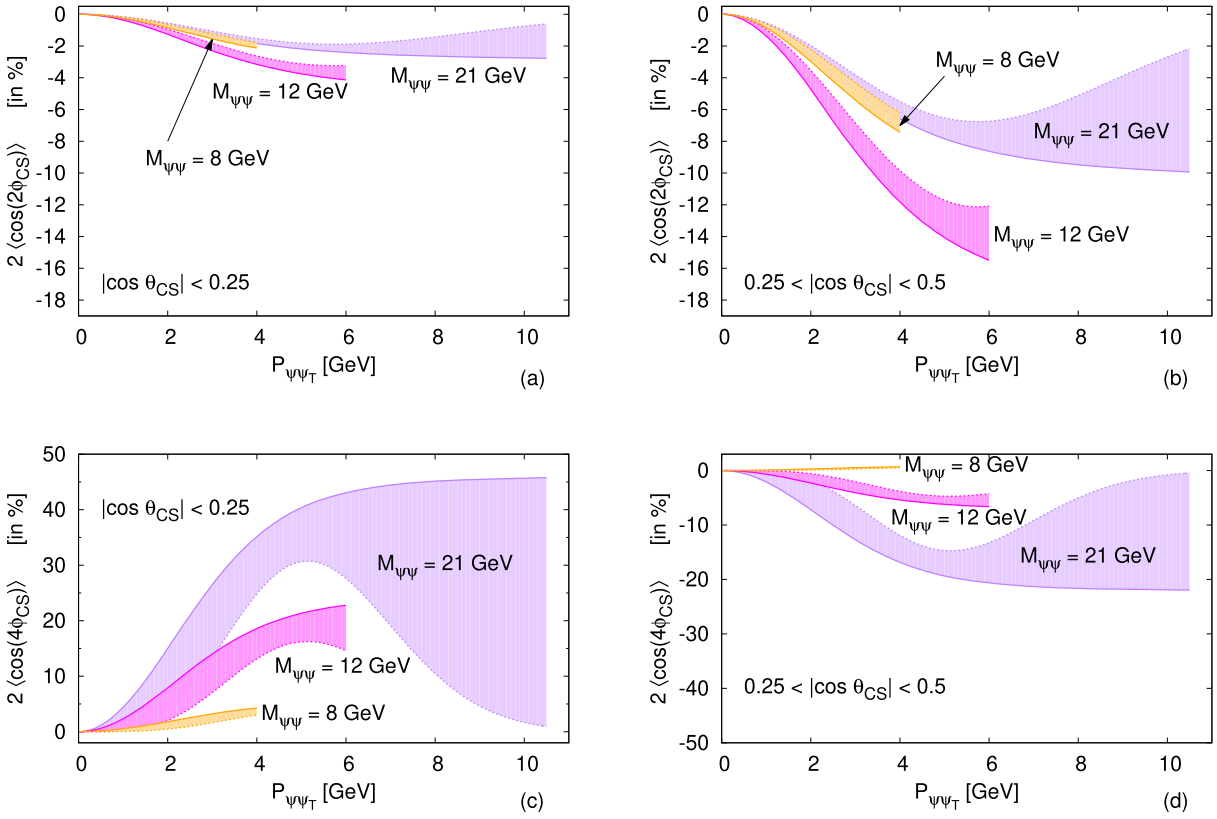

Fig. 1. $2\langle \cos n\phi_{CS} \rangle$ for $n = 2, 4$ computed for $|\cos\theta_{CS}| < 0.25$ and for $0.25 < \cos\theta_{CS} < 0.5$ for $\langle k_T^2 \rangle = 3.3$ GeV^2 for 3 values of $M_{\mathcal{Q}\mathcal{Q}}$ (8, 12 and 21 GeV) relevant respectively for the LHCb [1], CMS [2] and ATLAS [3] kinematics. The spectra are plotted up to $M_{\mathcal{Q}\mathcal{Q}}/2$. Our results do not depend on $Y_{\mathcal{Q}\mathcal{Q}}$. The uncertainty bands result from the use of both our models of $h_1^{\perp g}$. The solid line, which shows the largest asymmetries corresponds to the Model 2 (saturation of the positivity bound) and the dashed line to Model 1.